

AGRICULTURAL EDUCATION IN MISSOURI

Agriculture and the food, fiber and natural resource system is America's most creative, productive and foundational industry. Much of this country's success in agriculture can be attributed to a sound program of education. To advance a dynamic and efficient agriculture, food, fiber & natural resource system and to assure the continued well-being of our society, exceptional, well-rounded education must continue to be a high priority. A cooperative effort among educational institutions, government agencies and food, fiber and natural resource-related businesses will help Missouri provide leadership for the future through enhanced education.

Developments shaping food, fiber and natural resource systems

Participants representative of the food, fiber and natural resources industry were asked to identify the most important trends and developments over the next 30 years that will shape the future of agriculture and the food, fiber and natural resources systems. Five trends emerged as most important.

→ *Accelerating globalization of markets.*

- ◆ Economic globalization with increasing population and falling trade barriers is taking us toward a more competitive international marketplace for agricultural products in which more countries will produce more kinds of foods and market them on an international scale.

→ *Growing public demands for environmental protection and safe foods.*

- ◆ As production increases worldwide, pressures will grow everywhere to protect prime farmland from urban sprawl, conserve soil, safeguard water quality and fisheries, use water more efficiently, protect remaining wildlife habitats, and ensure a safe and healthy food supply.

→ *Increasing reliance on technology.*

- ◆ Advances in computers, communications, information, biotechnology and other areas of technology will greatly affect education, agriculture and the operation of the food, fiber and natural resource systems.

→ *Declining public understanding of Agriculture, Food, Fiber and Natural Resource Systems.*

- ◆ The general population is increasingly cut off from both direct experience and education related to Agriculture, which has serious repercussions in terms of ill-informed consumer behavior, public opinion, regulation and political decision-making.

→ *A more highly trained and diverse workforce.*

- ◆ A more diverse, highly trained workforce will be needed to manage the development of food, fiber and natural resource systems so that they will be competitive in the global marketplace and successful in an industry whose structure is changing.

Representatives from education (including instructors, administrators, and students) government agencies, industry, and other key stakeholders were brought together in a multi-stage initiative to uncover the key issues facing agricultural education in Missouri to address the five trends. Through this process, four key priorities were identified:

- A. Comprehensive Reach of Agricultural Education Programs
- B. Quality Curriculum and Resources
- C. Agriculture, Food, and Natural Resources (AFNR) Literacy
- D. Quality Instructors and Instruction

In addition to the key priorities, defining themes were outlined for each priority. These guiding ideas will be viewed and executed through the lens of the Missouri Agricultural Education Vision and Mission statements.

About Agricultural Education

Agricultural education is a systematic program of instruction available to students desiring to learn about the science, business, and technology of plant and animal production and/or about the environmental and natural resources systems. Agricultural education first became a part of the public education system in 1917 when the U.S. Congress passed the Smith-Hughes Act. Today, over 1 million students participate in formal agricultural education instructional programs offered in grades seven-adult throughout the 50 states and three U.S. territories.

Ag Ed Vision: *Agricultural education envisions a world where all people value and understand the vital role of agriculture, food, fiber and natural resources systems in advancing personal and global well-being.*

Ag Ed Mission: *Agricultural education prepares students for successful careers and a lifetime of informed choices in the global agriculture, food, fiber, and natural resources systems.*

Agricultural Education Delivery Systems

Agricultural Education - prepares secondary, postsecondary and adult students for a variety of careers and advanced college or technical training in the Agriculture, Food and Natural Resources System. Career opportunities for students range from positions in agribusiness, food science, agricultural mechanics and technology, plant science and horticulture, animal science, and natural resources conservation. Programs of study are delivered by the following: four-year "cluster" programs at comprehensive high schools and area career centers; two- year community college "specific" programs; and "supplemental" and "specific" adult education in high schools, area career centers and community colleges. At each level, training programs consist of three interrelated components:



Missouri Agriculture Enrollment Trends

The following table shows total enrollment in secondary, postsecondary and adult agriculture programs. High school agriculture enrollment has increased steadily since 1985. This reverses a trend of declining enrollment that began in 1977. Factors which contribute to the increasing enrollment have not been formally studied, but teachers and others indicate they believe that: 1) the economic improvement of agriculture affects attitudes of parents, students and counselors toward enrolling; and 2) agriculture programs have expanded content and increased flexibility. Postsecondary enrollment has also increased in response to a changing agriculture and the public attitude about the future of agriculture. Adult enrollment has fluctuated since reaching a peak enrollment in 1985-86.

Total Student Enrollment

<u>Year</u>	<u>No. of Programs</u>	<u>Secondary</u>	<u>Junior High</u>	<u>Postsecondary*</u>	<u>Adult**</u>
2024-2025	365	30,454	17,207	3,117	3,100
2023-2024	361	31,575	16,558	3,179	2,947
2022-2023	356	30,620	16,345	2,566	2,908
2021-2022	353	35,816	15,534	2,554	3,947
2020-2021	351	36,068	14,226	2,921	3,970
2019-2020	348	36,685	13,340	2,881	3,650
2018-2019	347	36,516	13,375	2,163	3,357
2017-2018	344	36,114	13,289	2,222	3,174
2016-2017	342	37,165	11,359	1,918	3,371
2015-2016	340	33,455	12,874	2,187	3,288
2014-2015	334	27,701	13,167	2,439	2,465
2013-2014	331	26,724	12,125	2,521	2,026
2012-2013	327	26,564	12,274	1,890	1,288
2011-2012	326	26,813	12,471	1,909	1,537
2010-2011	324	26,455	11,963	3,295	1,802
2009-2010	316	26,473	11,245	1,008	3,037
2008-2009	311	26,254	10,732	1,158	3,110
2007-2008	305	25,452	10,429	779	3,585
2006-2007	302	25,180	11,452	317	2,841
2005-2006	301	25,162	10,798	2,246	4,264
2004-2005	294	23,827	9,611	797	2,630
2003-2004	291	22,953	9,850	2,756	2,637
2002-2003	286	21,800	9,835	3,102	2,373
2001-2002	284	21,174	9,850	661	2,308
2000-2001	277	21,196	7,665	702	3,181
1999-2000	266	20,616	7,146	842	3,068
1998-1999	266	20,294	7,620	672	2,906
1997-1998	263	20,169	7,678	672	3,340
1996-1997	258	19,048	6,717	653	2,594
1995-1996	253	18,205	5,571	681	3,076
1994-1995	249	17,441	4,545	680	2,704
1993-1994	247	16,652	4,428	602	3,007
1992-1993	245	15,132	4,071	477	3,650
1991-1992	245	13,920	2,950	405	4,190
1990-1991	244	13,993		371	3,803
1989-1990	243	13,705		471	3,721
1988-1989	244	13,555		408	3,852

*Data from 13 institutions offering postsecondary agriculture.

**Adult programs are operated as part of local programs.

Secondary Agricultural Education in the Public Schools

Agricultural education has been a part of the public education system throughout the history of our country. When the Latin grammar schools gave way to the academies of the late 1700s, agricultural courses were sometimes included in the curriculum. While these were general theoretical courses, many states made them a requirement for graduation. With the passage of the Smith-Hughes Act of 1917, many general agriculture courses were replaced with a course called "vocational agriculture". This change from a general to a vocational focus was not well accepted by certain groups, and therefore the new courses were not included in all public-school curricula.

The goal of the vocational agriculture program was “to prepare young people for employment in farming.” After the National FFA Organization was founded in 1928 and became an integral part of vocational agriculture, the total program was adopted by many public schools. Over the years, the program has changed to meet the needs of society and the work force. For example, the number of farmers has declined from 13.8% of the work force in 1947 to less than 1% in 2022. It is now estimated that agriculture/agribusiness provides over 24 million jobs or 15% of all U.S. employment. The Vocational Act of 1963 encouraged expansion of the vocational agriculture program to include training for entry into other agricultural occupations besides farming.

Non duplicated enrollment in high school agriculture in Missouri is 30,454 students. Currently, 321 comprehensive high schools and 44 area vocational schools offer agriculture. Of the students enrolled, over 43% are female. There are 537 agriculture teachers in secondary schools. In 2023-2024, the program was offered in 66% of Missouri's public school districts maintaining high schools, and approximately 11% of the high school students were enrolled.

High School agriculture is a four-year program. A student normally earns four to six credits. The following table shows course offerings and enrollments for the past ten years.

Course Offerings and Enrollments/Number of Schools

Courses	15-16	16-17	17-18	18-19	19-20	20-21	21-22	22-23	23-24	24-25
Agricultural Science I	305	310	308	309	310	312	311	312	313	314
Agricultural Science II	283	275	268	274	270	263	265	255	260	263
AgriBusiness Sales & Marketing	86	83	62	86	63	64	63	61	70	63
Agricultural Communications & Ldrship	96	108	108	97	108	104	107	115	114	112
Agricultural Construction	220	222	218	230	220	212	234	215	224	216
Agricultural Machinery	32	35	39	33	39	42	34	46	49	46
Agricultural Management/Economics	66	61	59	59	59	52	46	48	48	52
Agricultural Power I	79	73	67	73	67	70	68	65	62	62
Agricultural Power II	14	20	17	14	17	17	18	14	15	17
Agricultural Structures	132	136	131	130	132	130	120	127	116	131
Animal Science	176	169	172	180	173	175	184	179	187	195
Biotechnology	6	8	7	6	7	6	5	6	5	6
CASE Ag Business Foundations							29	27	22	14
CASE Ag Power And Technology							14	12	11	10
CASE Animal And Plant Biotechnology							7	4	2	2
CASE Food Science And Safety							12	12	11	11
CASE Introduction To AFNR							21	20	18	19
CASE Mechanical Systems In Ag							1	1	0	1
CASE Natural Resources And Ecology							11	12	10	9
CASE Principles Of Ag Science - Plant							13	11	1	12
CASE Principles Of Ag Science -Animal							17	17	14	15
Conservation Natural Resources	112	102	105	114	106	98	109	105	104	110
Crop Science	41	34	47	45	47	39	42	37	44	40
Equine Science	10	9	12	11	12	9	8	9	7	8
Floriculture	41	44	46	52	46	58	61	68	64	60
Food Science & Tech	57	51	63	61	64	68	65	75	79	81
Forest Management	20	19	19	18	20	17	18	12	14	19
Greenhouse Operation/Management	175	177	178	173	178	175	181	190	186	181
Landscaping	64	65	77	66	77	64	67	63	56	58
Nursery Operation & Management	20	20	20	17	21	18	21	18	21	24
Supervised Occup. Exp. In Ag (Co-op)	73	81	115	76	75	81	92	88	84	77
Turf Management	10	5	7	7	7	8	4	6	5	9
Veterinary Science							53	45	46	45

Number of Students Enrolled

Courses	15-16	16-17	17-18	18-19	19-20	20-21	21-22	22-23	23-24	24-25
Agricultural Science I	9927	9583	9702	9773	9487	9439	10470	10750	10702	10486
Agricultural Science II	5673	5150	4961	4976	4964	4931	4836	5352	5593	5489
Agribusiness Sales & Marketing	855	837	932	616	656	567	577	599	766	666
Agricultural Communications & Ldrship	924	955	837	1001	929	956	978	1145	984	1103
Agricultural Construction	3405	3249	3193	3109	3186	3023	3574	3350	3492	3316
Agricultural Machinery	583	582	548	611	534	708	675	777	827	745
Agricultural Management/Economics	717	648	637	632	551	482	497	549	497	474
Agricultural Power I	1121	958	921	810	770	811	1062	886	842	857
Agricultural Power II	149	212	151	158	149	170	218	170	178	177
Agricultural Structures	1582	1641	1535	1579	1450	1458	1376	1574	1573	1741
Animal Science	2406	2390	2342	2347	2327	2389	2245	2155	2547	2579
Biotechnology	118	96	85	125	81	84	72	99	65	77
CASE Ag Business Foundations							207	210	498	113
CASE Ag Power And Technology							293	326	257	246
CASE Animal And Plant Biotechnology							105	77	62	21
CASE Food Science And Safety							130	141	86	127
CASE Introduction To AFNR							1045	1081	1047	1113
CASE Mechanical Systems In Ag							14	15	0	0
CASE Natural Resources And Ecology							138	144	98	102
CASE Principles Of Ag Science - Plant							258	225	318	257
CASE Principles Of Ag Science -Animal							216	288	264	272
Conservation Natural Resources	1487	1428	1479	1461	1320	1458	1484	1689	1418	1482
Crop Science	644	430	548	546	512	446	455	449	584	472
Equine Science	168	146	140	199	156	142	112	175	112	142
Floriculture	648	611	762	778	807	733	843	961	1173	1074
Food Science & Tech	687	645	778	728	841	914	951	1084	1197	1270
Forest Management	275	256	269	229	197	249	313	170	271	331
Greenhouse Operation/Management	2529	2620	2397	2439	2461	2520	2715	2897	2801	2823
Landscaping	773	783	808	919	791	795	778	764	774	736
Nursery Operation & Management	198	260	142	221	211	217	255	274	234	301
Supervised Occup. Exp. In Ag (Co-op)	527	622	639	575	664	585	633	627	671	768
Turf Management	128	73	119	76	90	76	40	80	77	114
Veterinary Science	441	431	667	583	629	624	719	499	652	749

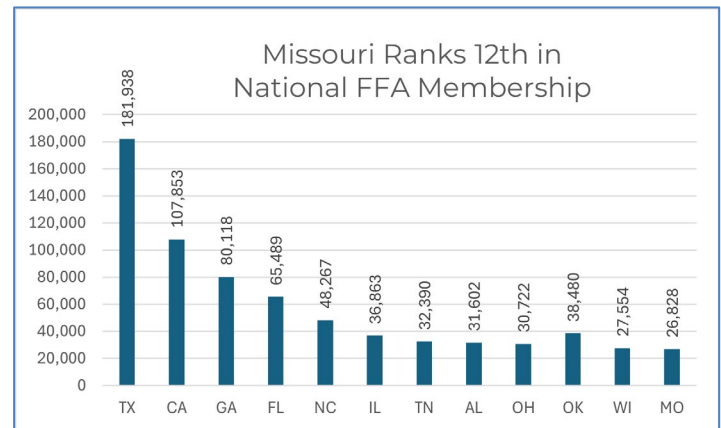
Student Career Interest

All students enrolled in agriculture programs are asked to identify an agricultural interest in one of six Agricultural Career Cluster areas. The following percentages reflect student choices in 2024-2025.

Pathway	% of Total	With-in Cluster Pathway
Agricultural Business/Management Systems	15%	Males-51% Females-49%
Agricultural Mechanics & Technology	33%	Males-87% Females-13%
Animal Science Systems	26%	Males-30% Females-70%
Food Science Systems	8%	Males-46% Females-54%
Natural Resources/Conservation Systems	8%	Males-67% Females-33%
Plant Science/Horticultural System	10%	Males-35% Females-65%

FFA Membership

FFA activities are designed to teach leadership and promote personal skill development. Students can become involved at the area, district, state and national levels in various ways. Each approved agriculture education program in Missouri has a chartered FFA chapter. The 2024-2025 membership in the Missouri FFA was 26,828.



Supervised Agricultural Experience

Each student is counseled to select courses and Supervised Agricultural Experience Program (SAEP) activities that relate to their agricultural interest.

Of the 74% of students who completed SAE programs in 2024, 14% had ownership projects and 50% had placement projects (working for someone in an agribusiness or on a farm), 14% had agriscience projects, and 22% had some combination of the above types. The average SAEP net income per student for 2024 was \$3,934. Statewide, over \$76,490,918 net income was generated through SAE programs.

Top 5 Supervised Agriculture Experience Programs (SAE's) in Missouri

Rank	SAEP	Students
1	Placement Food Prod Systems	3,626
2	Placement Power Structure Systems	2,735
3	Placement Animal Systems	2,694
4	Placement Agribusiness System	2,580
5	Placement Plant Systems	1,981

Year	<u>Avg. Net Income Per Student</u>	<u>Statewide Net Income</u>
2025	\$3,934	\$76,490,918
2024	\$3,967	\$69,827,158
2023	\$3,589	\$67,328,443
2022	\$3,222	\$58,195,602
2021	\$3,275	\$57,406,955
2020	\$3,009	\$51,452,197
2019	\$2,755	\$48,943,868
2018	\$2,990	\$50,586,030
2017	\$2,786	\$52,529,788
2016	\$2,716	\$46,414,747

These were the types of projects chosen by students in 2023-24.

Ownership Projects

	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
Horses	1152	1139	1125	1077	996	606	987	1017	742	715	708
Dogs	995	954	991	989	1037	620	934	974	823	690	673
Rabbits	444	446	431	417	378	204	439	456	359	285	318
Goats	518	516	481	487	516	300	560	567	494	445	459
Fish	17	20	23	15	20	19	15	15	24	20	7
Bees	60	56	76	1194	84	55	73	74	71	73	74
Poultry	993	1055	1154	1064	1099	683	1072	1098	1035	1084	1019
Sheep	351	332	349	374	321	216	378	386	385	348	325
Swine	963	917	961	914	880	595	894	916	864	718	714
Dairy	134	129	135	93	114	68	114	132	90	65	74
Beef	2407	2359	2405	2845	2325	1703	2369	2526	2169	1905	1760
Agribusiness	1118	1791	1157	746	1127	630	960	1019	959	1047	1167
Custom Work – Other	450	56	55	11	12	3	0	66	0	0	0
Vegetables	422	325	280	343	433	152	371	379	370	333	331
Plants	274	235	226	237	313	73	278	286	502	277	324
Berries/Grapes	56	39	38	24	26	18	24	24	35	42	35
Trees/Wood lot	139	125	130	154	189	108	133	135	153	121	95
Sunflowers	10	8	5	2	4	2	4	4	4	6	6
Tobacco	2	1	1	1	0	1	0	0	2	0	0
Forages/Hay	186	189	156	154	173	105	184	190	141	104	98
Rice	1	1	3	3	4	4	4	4	1	10	16
Cotton	6	5	1	5	4	2	2	2	1	0	1
Soybeans	221	299	186	197	377	116	334	336	158	150	146
Milo	15	9	8	7	18	2	3	3	5	6	6
Corn	190	158	171	157	182	98	173	174	187	366	138
Wheat	73	61	59	54	55	23	42	42	40	32	33
Hams		303	355	318	363	282	274	274	397	226	359
Small Grain		10	9	4	9	8	5	5	7	7	10
Pasture		309	305	288	328	196	322	327	239	185	195
Tree Nuts		14	11	19	23	1	12	12	10	15	10

Placement Projects

	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024
Agribusiness Sys	7707	4004	3671	3719	3619	2300	2533	2706	2647	2687	2580
Food Prod/Proc Sys	5557	2417	3455	2983	3002	1899	2,689	2757	3159	3217	3626
Directed Lab unpaid	1535	692	472	619	702	395	569	620	556	681	877
Animal Systems		3325	3407	3068	3053	3273	2,819	2988	2776	2611	2694
Biotech Systems		38	29	93	94	42	27	35	44	40	36
Enviro Science Sys		289	356	285	378	217	305	323	301	278	255
Natural Res Sys		581	1051	617	561	424	596	608	568	538	558
Plant Systems		1553	1603	1397	1727	1100	287	1628	1626	1595	1981
Power Struct/Tech Sys		1401	1624	1710	2585	1304	1,922	1966	2127	2183	2735
Agriscience unpaid		768	248	188	286	225	362	367	348	384	295
Exploratory unpaid		1121	653	506	685	397	697	697	989	871	1369
Analytical unpaid		707	527	87	21	57	18	18	16	26	13

Graduate Placement

In 2023, there were 5,115 high school agricultural education graduates. Of this number 95.5% were placed.

35% are employed

- 65% in agriculture
- 35% in other areas

58% are continuing their education

- 64% in agriculture
- 36% in other areas

2% are in the military

- 60% in agriculture related fields
- 40% in non-agriculture related fields

3% are not employed

<1% are not available for employment

<3% could not be found (status unknown)

Of the total, 61% are pursuing agriculture as a career.

Postsecondary Agricultural Education

Twelve community colleges and one state technical college in Missouri staffed with 24 instructors currently offer postsecondary-level training in agriculture. During 2024-2025, these 13 institutions served 3,117 students in 8 career programs:

- Agricultural Production/ Farm Management
- Animal Health Technology
- Agricultural Business
- Agricultural Equipment
- Agricultural Power and Machinery
- Horticulture
- Landscape, Nursery and Turf Management
- Biotechnology

The typical postsecondary student is a high school graduate who wants to train for a middle- management position and/or transfer to a baccalaureate institution.

Postsecondary programs provide 60-64 credit hours of instruction in a two-year program for a full-time student. Programs include supervised occupational experience gained through internships and on-the-job training. Students are employed throughout Missouri and, in some cases, in other states. In most areas, students are paid for their services during the internship and also receive academic credit.

Of the 85 postsecondary/adult (2 year) agriculture graduates in 2023, 95.5% are placed.

86% are employed

- 89% in agriculture
- 11% in other areas

3% are continuing their education in agriculture

8% are continuing their education not in agriculture

<1% are not employed

<1 % are not available for employment

0% could not be found (status unknown)

Of the total, 80% are pursuing agriculture as a career.

Leadership development is available through the Missouri and National Professional Agricultural Student Organizations (PAS). The Missouri Professional Agricultural Student Organization (MPASO) was established in 1981. Membership is open to any student enrolled in a postsecondary agriculture program. In Missouri, nine institutions have local PAS organizations. PAS members have the opportunity to participate in the state conference where career ready competitions are held, state officers are elected, and the state business is conducted along with a fall leadership conference.

Adult Agriculture

Adult agriculture classes were organized soon after the Smith-Hughes Act was passed in 1917 and have been recognized as a part of agricultural education ever since. Several types of adult education have been offered through the years in Missouri.

"Topics" classes that highlight one-session meetings have long been, and still are, a viable part of adult education in agriculture. These classes tend to address current problems and issues, update enrollees with new technologies, and explore subjects of general interest to a fairly diverse audience. Currently, they are the most common type of adult class offered. "Topics" classes typically include 8 to 12 sessions and meet weekly, biweekly or monthly, primarily during the winter months.

"In-depth" classes are becoming a popular way of providing education to adults in agriculture. An "in- depth" class is a series of sessions on the same topic (for example, a two-to-eight session series in horticulture, marketing, forestry or ag mechanics). Because content is specialized, enrollment is sometimes lower. Traditionally, "topic" and "in-depth" classes are offered as a part of local programs, and instructors are paid an hourly rate based on instructional time.

The Farm Business Management Analysis (FBMA) program is a third type of adult education in agriculture. The program involves class work, on-site visitations and record analysis, all designed to improve the management of the farm business and to help farmers achieve their personal, financial and farm business goals.

A significant development in adult leadership training was the formation of the Missouri Young Farmers/ Young Farm Wives organization in 1972. This organization involves adults in educational and leadership activities at the local, district, state and national levels. Membership in the organization is open to persons of any age. State activities include a 2-day convention in February, a 2 1/2-day tour in July/August and participation in the Governor's Conference on Agriculture.

These facts and figures describe the status of adult agricultural education in Missouri:

- 3,100 adults enrolled in DESE reimbursed agriculture classes in 2024-2025.
- 18 schools received DESE reimbursement for adult classes in 2024-2025.
- There were 15 active Young Farmers/Young Farm Wives chapters in 2023-2024. State membership totaled 295.
- Agriculture instructors in 20 schools had part or all of their time scheduled for adult instruction in 2024-2025 and over 130 farm families enrolled in the FBMA program.

The Development of Professional Teachers of Agriculture

Missouri law and the Department of Elementary and Secondary Education's regulations require all teachers and administrators in career and technical education programs to be specifically certificated for their teaching assignments.

In 2024-25, Missouri had seven institutions training agriculture teachers: University of Missouri-Columbia, Northwest Missouri State University at Maryville, Southeast Missouri State University at Cape Girardeau, Missouri State University at Springfield, College of the Ozarks, Point Lookout, University of Central Missouri at Warrensburg, and Lincoln University at Jefferson City.

Pre-service programs alone cannot adequately prepare all teachers in all competencies. Therefore, professional development programs are designed and offered to assist the teachers in meeting their needs and the needs of their clientele. The program is jointly planned by teachers, teacher educators and state supervisors. A Professional Development Specialist manages the state-wide effort.

Agriculture as a Part of General Education

Agricultural education began in this country as a part of general education. Passage of the Smith- Hughes Act in 1917 promoted the concept of "vocational agriculture" as a separate program. The narrow focus of vocational agriculture was broadened somewhat through the Vocational Education Act of 1963, which encouraged training for non-farm agricultural occupations. Today, however, the basic differences between the "general" and "vocational" approaches remain.

Our society's foundational knowledge of agriculture is steadily declining. As a result, more individuals entering agriculture-related careers may have limited understanding of the industry. Additionally, a growing number of young people pursuing agriculture-related occupation come from non-agricultural backgrounds, making agricultural education more important than ever. Another important issue today is providing a vocational education for adults. Many adults, for example, are interested in studying agriculture--not for career purposes, but to meet a vocational, hobby or secondary-income objectives. Additionally, more public and social interest is being focused on issues related to agriculture, food and the environment. Such trends signal a need for students and citizens in general to be better informed about the importance of agriculture and its relationship to their lives. In other words, our American society needs to be agriculturally literate.

Several projects are now underway in Missouri to develop agricultural literacy by promoting public awareness and understanding of agriculture's role in our economy and society. At the junior high/middle school level, exploratory agricultural literacy courses were offered in 2024-2025 to 17,207 seventh and eighth grade students in 270 schools. Other examples of this effort are the "Agriculture in the Classroom" project, supported by Missouri Farm Bureau and the Ag Ed on the Move program by MO Farmers Care and commodity organizations, which introduce young students to concepts about agriculture and food production.

Building public awareness and understanding about issues and trends affecting agriculture in our state as well as our nation is vital to having an informed citizenry.

2025 AGRICULTURAL EDUCATION IN MISSOURI ANNUAL REPORT DATA

1. NUMBER OF AGRICULTURE DEPARTMENTS AND SECONDARY, POSTSECONDARY AND ADULT ENROLLMENT IN MISSOURI

Year	No. of Depts.	Secondary Enrollment	Ave. Enrollment	No. of Jr. High Programs	Enrollment Jr. High	No. FFA Chapters	FFA Membership	Sup. Chapters	State Degree	Amer. Degree	Dist. Contest Teams
1985-86	245	12,865	52.3			245	13,723	142	412	25	1479
1986-87	244	13,443	55.1			244	13,597	149	409	23	1473
1987-88	244	13,555	55.6			244	13,574	158	406	27	1470
1988-89	243	13,705	56.4			243	13,599	138	411	27	1489
1989-90	244	14,020	57.5			244	13,478	141	404	83	1477
1990-91	245	13,920	56.8			245	13,494	143	405	120	1454
1991-92	245	15,132	61.8	65	2,950	245	14,511	185	437	119	1513
1992-93	247	16,652	67.4	79	4,071	247	15,715	183	471	131	1607
1993-94	249	17,441	70	79	4,428	247	16,345	199	495	131	1562
1994-95	253	18,205	71.9	95	4,545	250	17,372	205	505	163	1637
1995-96	258	19,048	73.8	111	5,571	258	17,517	212	527	163	1687
1996-97	262	20,004	76.7	135	6,717	262	18,228	225	550	168	1738
1997-98	266	20,294	76.3	142	7678	266	19,185	218	583	170	1770
1998-99	266	20616	77.5	149	7620	266	19184	236	568	194	1741
1999-2000	277	21196	76.5	146	7146	277	19527	227	584	206	1740
2000-01	284	21744	76.5	156	7665	284	20178	235	598	198	1732
2001-02	286	21800	76.5	180	9834	286	20588	244	618	256	1668
2002-03	291	22,953	78.8	180	9850	291	21254	242	634	286	1714
2003-04	294	23,827	81.9	175	9611	294	21805	252	652	300	1745
2004-05	301	25,162	83.6	186	10798	301	22536	261	677	311	1745
2005-06	302	25,180	83.4	186	11452	302	23021	273	691	314	1761
2006-07	305	25,452	83.4	174	10429	305	23782	260	713	327	1835
2007-08	311	26,254	84.4	188	10732	311	24,157	258	724	374	2055
2008-09	316	26,473	83.8	202	11245	316	24,416	248	732	387	2149
2009-10	324	26,455	81.7	206	11,963	324	24,903	260	747	412	2289
2010-11	326	26,813	82.3	208	12,471	326	25,077	208	752	481	2273
2011-12	327	26,564	80.9	216	12,274	327	25,760	257	773	441	2300
2012-13	331	26,724	80.7	210	12,095	331	25,061	263	752	440	2221
2013-14	334	27,701	83.2	225	13,167	334	25,852	263	777	474	2213
2014-15	339	28,664	84.6	227	12,874	339	25,779	285	775	464	2362
2015-16	342	28,285	82.7	207	11,036	342	25,646	270	774	463	2284
2016-17	344	27,395	79.6	236	13,289	344	25,784	277	761	466	2166
2017-18	343	27,104	79.2	226	13,375	343	25,046	266	756	517	2332
2018-19	347	27,977	80.6	234	14,193	347	25,331	255	761	518	2696
2019-20	348	27,668	79.5	215	13,340	348	24,975	267	988	513	291
2020-21	351	26,260	74.8	236	14,226	351	23,430	260	858	504	1633
2021-22	353	29,367	83.2	249	15,534	353	26,260	268	893	539	1837
2022-23	356	30,620	86	263	16,345	356	26,830	276	962	582	1995
2023-24	361	31,575	87.5	258	16,558	361	26,968	270	1,061	608	2026
2024 - 25	365	30,454	83.4	270	17,207	365	26,828	284	1,088	663	2102

II. POSTSECONDARY

ADULT

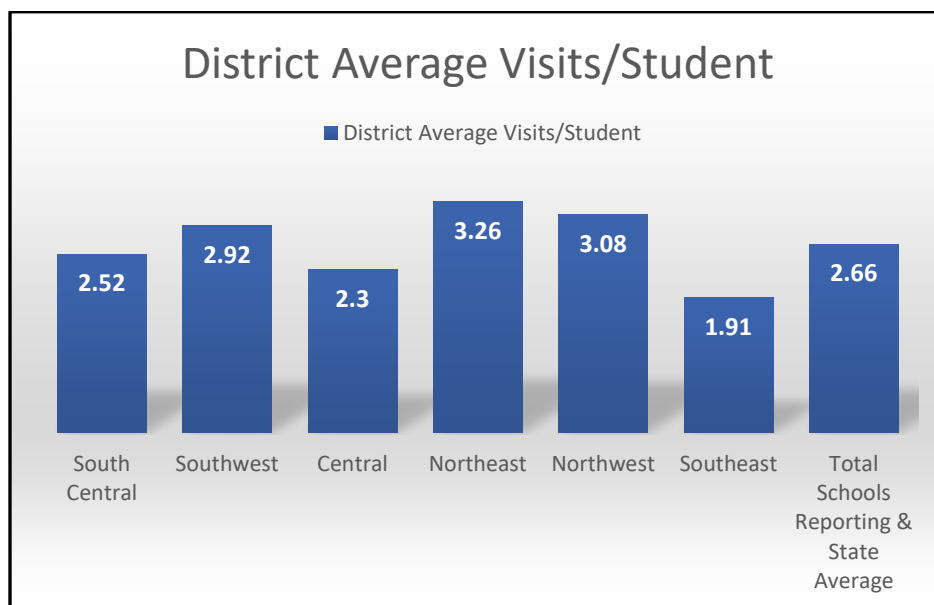
No. of		No. PAS			No. YF/YFW		Membership	Full/Part-Time	FBMA	
Year	Depts	Enrollment	Chapter	Membership	No. of Progs	Enrollment	Chapters	YF/YFW	Instructor	Enrollees
1989-90	9	477	5	120	94	4190	59/23	1333/305=1638	37	444
1990-91	9	602	5	120	79	3650	55/24	1226/292=1518	32	419
1991-92	8	680	5	128	769	3007	54/24	1234/306=1540	32	357
1992-93	8	681	5	120	73	2704	52/23	1122/298=1420	27	326
1993-94	8	653	5	120	61	3076	46/24	960/277=1237	29	310
1994-95	8	672	5	120	82	2594	48/23	986/294=1280	31	334
1995-96	9	672	6	140	66	3340	46/21	908/254=1162	30	286
1996-97	10	842	7	150	54	2906	48/20	877/244=1121	26	203
1997-98	10	702	7	150	49	3068	49/18	939/230=1169	26	205
1998-99	12	661	7	150	55	3181	54/17	929/192=1121	30	265
1999-00	12	728	7	150	54	2308	48/13	915/141=1056	32	262
2000-01	12	950	7	150	54	2435	43/13	830/130=960	32	237
2001-02	12	3102	8	170	54	2373	44/12	908/133=1041	26	161
2002-03	12	2756	7	180	42	2637	44/12	885/148=1033	24	129
2003-04	12	2797	7	208	40	2630	40/9	890/117=1007	25	133
2004-05	12	2245	7	187	37	4264	40/12	939/132=1062	25	124
2005-06	12	860	7	192	37	2841	43	924	24	110
2006-07	12	1043	7	145	35	3585	46	999	24	80
2007-08	12	1158	8	154	35	3110	43	980	24	168
2008-09	12	1008	8	160	37	3178	44	879	24	184
2009-10	12	3295	8	220	44	1802	34	821	24	149
2010-11	12	1909	7	200	48	1537	34	821	24	153
2011-12	12	1809	8	262	48	1391	27	794	26	134
2012-13	12	2521	7	373	48	2026	23	664	26	122
2013-14	12	2439	9	405	45	2465	27	770	25	137
2014-15	10	2159	8	360	27	3276	24	686	42	137
2015-16	12	1,918	5	230	27	3,371	27	691	42	150
2016-17	12	2,222	5	358	27	3,174	22	608	42	153
2017-18	12	2,163	8	294	27	3,357	24	533	39	155
2018-19	14	2,881	8	272	39	3,650	24	533	53	160
2019-20	14	---	5	206	49	3,920	24	331	35	175
2020-21	14	2921	5	206	49	3,970	13	230	37	107
2021-22	12	2554	5	183	42	2,554	26	429	37	175
2022-23	14	2566	7	204	41	2,947	23	453	38	150
2023-24	12	3,179	9	205	34	2,947	18	380	22	150
2024-25	13	3117	7	300	30	3100	15	295	20	131

III. SUPERVISED AGRICULTURAL EXPERIENCE

Without a well supervised agricultural experience program for agriculture students, instruction becomes academic rather than vocational. The instructors of agriculture are responsible for making agricultural experience a valuable and realistic experience to enhance classroom and laboratory instruction. Without close supervision and adequate on-site visitations by the instructor, the students are being denied a very important phase of their total instructional program. The desired number of visits per instructor is 180. In 2023-24 the average number of SAE visits per department was 221.

2024 SAE VISIT TOTALS IN MISSOURI					
District	Schools Reporting	District Average Visits/Student	Total Visits	At School	On Site
South Central	41	2.52	9449	6302	3147
Southwest	69	2.92	17802	12298	5504
Central	66	2.3	12466	7863	4603
Northeast	62	3.26	18918	11207	7711
Northwest	51	3.08	8825	5386	3439
Southeast	41	1.91	5694	4137	1557
Total Schools Reporting & State Average	330	2.66	73154	47193	25961

The summary data from 321 school districts shows 74% of students completed SAE's and earned \$76,490,918



IV. SUMMARY OF SUMMER PROGRAM – Summer 2024

Summary of Summer Program (Refer to June, July, and August Monthly Reports and Summer Calendar)		
	No./Per cent of Schools Responding YES	Total Number - 344 Schools Responding
1. A summer plan was written, submitted, and discussed with the administration.	89%	
2. A detailed summer plan was submitted to the Ag Education district supervisor.	46%	
3. A report of the completed summer instructional program was written, submitted and discussed with the administration.	77%	
4. The local Ag program has completed a program evaluation tool in the last 3 years and has been reviewed annually. NQPS: 103 MO Sqi: 180		NQPS 28 % MOSQI 52%
5. Curriculum was aligned to updated foundational competencies.	97%	
6. Laboratory(s) were maintained, repaired, and materials ordered (as needed).	96%	
7. Prospective students were visited/contacted once each during summer.	80%	23 avg. Visits
8. Each secondary student record book was reviewed once each summer.	70%	
9. Each secondary student was visited/contacted.	67%	20,052
10. Total secondary visits per summer per teacher equaled at least 60.	53%	20,287 Visits
11. 50%of the teacher's time was spent supervising student's SAEP.	70%	8,760 Days
12. Number of adult visits made during the summer.		947 Visits
13. The local Young Farmers Association participated in the Young Farmers Tour.	6%	
14. Summer school was taught.	9%	433 Students
15. Vacation taken.	78%	8 avg. Days
16. The MVATA/MVA Conference was attended.	88%	
17. Graduate school and/or Professional Development was attended.	85%	2,386 Days
18. The local FFA chapter held monthly meetings.	79%	1067 Meetings
19. The local FFA chapter officers attended the LEAD Conference.	33%	964 Officers
20. The local FFA chapter participated in FFA Camp: 107 WLC: 48 PSA: 26		FFA Camp 31% WLC 14% PSA 8%
21. The local FFA chapter participated in the Local Fair: 284 District Fair: 218 State Fair: 235		Local Fair 82%, District Fair 63 % State Fair 68%

V. 2024-25 Salary of Secondary Agriculture Instructors - State Average: \$63,880

Salary	Northeast	Northwest	Central	South Central	Southeast	Southwest	Totals
< 27,000		3	1				4
28,000							
29,000							
30,000							
31,000							
32,000		1					1
33,000						1	1
34,000	3						3
35,000	1					1	2
36,000			1	1			2
37,000	1			1		2	4
38,000							
39,000	2				1	1	4
40,000				2	1	1	4
41,000			2		1		3
42,000				1		2	3
43,000	4		2	1		1	8
44,000	1	1	1			1	4
45,000				2		3	5
46,000	1	4	2	1			8
47,000	4	1	2	2	3	4	16
48,000		1	1	3	1	1	7
49,000	1	1				1	3
50,000	2	3	1		1	2	9
51,000	1	4	5		1	3	14
52,000	2	1	1	2	2	5	13
53,000	1	2	1	1	2	3	10
54,000	3		4	2	1	6	16
55,000 - 57,000	11	6	8	5	4	10	44
58,000 - 60,000	12	4	11	8	5	7	47
61,000 - 63,000	8	7	13	9	6	9	52
64,000 - 66,000	4	8	5	7	9	8	41
67,000 - 69,000	14	7	8	6	2	12	49
70,000 - 72,000	7	2	7	6	1	12	35
73,000 - 75,000	2	2	5	7		7	23
76,000 - 78,000	6	4	6	4	3	5	28
78,000+	14	9	14	9	5	25	76
Number of Teachers	105	71	101	80	49	133	539

VI. TEACHING EXPERIENCE OF 2024-25 INSTRUCTORS EMPLOYED FULL-TIME WITH SECONDARY, POSTSECONDARY AND/OR ADULT ASSIGNMENT.

Years Teaching	Northwest	Northeast	Central	South Central	Southeast	Southwest	Total
1	10	16	12	6	6	14	64
2	4	13	7	8	6	9	47
3	7	11	10	10	7	13	58
4	2	11	4	3	3	10	33
5	4	5	6	7	2	3	27
6	2	7	3	3	2	7	24
7	3	2	3	5	3	6	22
8	3	2	4	1	1	1	12
9	1	3	4	3	1	9	21
10	1	1	5	3	1	2	13
11	2	2	2	2	2	9	19
12	1	7	2	1	0	6	17
13	5	2	4	1	2	2	16
14	2	0	5	0	2	2	11
15	2	6	2	1	3	5	19
16	1	2	3	0	0	5	11
17	2	1	5	2	4	3	17
18	3	0	2	2	2	2	11
19	2	3	2	4	1	3	15
20	1	4	3	3	1	2	14
21	0	1	6	1	1	3	12
22	4	4	3	3	0	0	14
23	1	0	3	0	3	1	8
24	1	3	1	2	2	2	11
25	2	2	5	0	0	4	13
26	0	1	1	4	1	6	13
27	1	2	1	1	1	3	9
28	2	1	0	3	1	1	8
29	2	1	0	1	0	3	7
30	0	2	0	1	0	1	4
31-42	1	1	2	2	0	3	9
Total	72	116	110	83	58	140	579

Teacher Experience Summary		
Teachers	Years Experience	Percent of Total
229	5 years or less	40%
92	6 - 10 years	16%
150	11 - 20 years	26%
99	21 - 30 years	17%
9	more than 30 years	2%